

REMARKS

Upon entry of this amendment, Claims 1, 5, 9-18, 20-22, 24-27, 30-32, 35-55 constitute the pending claims in the present application. Applicants reserve the right to prosecute claims of identical or similar scope in future divisional and/or continuation applications.

Applicants respectfully request reconsideration in view of the following remarks. Issues raised by the Examiner will be addressed below in the order they appear in the Office Action.

Rejection of Claims 19 and 23 under 35 U.S.C. § 112, second paragraph

The Examiner rejects Claims 19 and 23 as allegedly being indefinite. The Office Action asserts that the claims merely provide an intended use without properly setting forth further structural limitations.

While not acquiescing to the rejection, and solely for the purpose of expedite prosecution, Applicants have canceled Claims 19 and 23 without prejudice. Applicants reserve the right to prosecute claims of identical or similar scope in future continuation and/or divisional applications.

Reconsideration and withdrawal of the rejection are respectfully requested.

**Rejection of Claims 1, 2, 12, 14, 15, 18, 20, 22, 25, 27, 28, 31, 32, 36, 37, 40, 41, and 44-46
Under 35 U.S.C. § 102(b) as allegedly anticipated by U.S. Pat. No. 5,591,139 (Lin et al., first cited in IDS filed on January 21, 2000)**

Specifically, the Examiner states that Lin teaches a microneedle with “a hollow shaft of length from 1-6 mm and width of approximately 80 μm connected to an interface region (substrate) that includes a channel (collection chamber) for collecting and sensors for analyzing the fluid.” To support this position, the Examiner cited Figures 1A, 2A, 6, and 7 of Lin, and descriptions in Lin (*e.g.*, column 3, line 19 - column 4, line 17; and column 9, line 34 - column 10, line 14).

Applicants respectfully disagree, because the Figures and passages cited by the Examiner fail to support the Examiner’s position. In fact, they contradict the Examiner’s position.

Applicants submit that Lin fails to disclose at least the microneedle having “a length between 500 μm and 1 mm” as recited in the pending claims.

Column 3, lines 26-27 of Lin unambiguously indicates that “[m]icroneedle 10 includes an interface region 11 and a shaft 14 having a microflow channel 78 therein along its length” (emphasis added). Thus according to its own teaching, the microneedle of Lin includes both the portion of channel 78 in the interface (11) region, and the portion of channel 78 in the shaft (14) region. This is further supported by lines 34-37 of col. 3: “...channel 78 runs along the length of fully-enclosed microneedle shaft 14. A series of thin polysilicon heating resistors 60 are located on interface region 11 along the floor of microflow channel 78” (emphasis added). See Figures 1A and 2A.

Based on this interpretation, and according to Figure 2A and col. 4, lines 12-15: “[t]he width of the interface region, indicated by dimension ‘X,’ is approximately 1.5 mm, and the length of the shaft indicated by dimension ‘Y,’ is between 1 and 6 mm.” Since the total length of the microflow channel 78 roughly corresponds to the sum of X and Y, the length of the Lin microneedle / microflow channel 78 is between 2.5 to 7.5 mm.

Therefore, the microneedle as disclosed in Lin is at least 2.5 to 5 times as long as the microneedles of the rejected claims, and thus cannot anticipate the claims. Reconsideration and withdrawal of the rejection are respectfully requested.

Applicants have also added new claims 47-55, which are independent claims directed to subject matters corresponding to Claims 8, 9, 13, 26, 38, and 42. The Examiner has indicated in the Allowable Subject Matter section that certain features, such as those recited in Claims 8, 9, 13, 26, 38, and 42, are not taught or suggested by the prior art. Thus Claims 47-55, which encompass such subject matter, would be allowable as independent claims.

Rejection of Claims 1-4, 6, 7, 10, 15, 27, 29-34, 36, and 40 Under 35 U.S.C. § 103(a) as being obvious over JP 7-132119 (Yoshihiko, first cited in IDS filed on January 21, 2000) in view of Lin (supra)

The Examiner argues that Yoshihiko teaches all the limitations of the claimed invention, except that the length of the microneedles being between 500 µm and 1 mm, while Lin allegedly cures the defect.

Because of the admitted defect of Yoshihiko, and the failure of Lin to correct this defect as discussed above, Applicants submit that the combined teaching still fails to teach or suggest

all the limitations of the claimed invention, even assuming without agreeing, for the sake of argument, that there is motivation to combine Yoshihiko and Lin.

Thus, reconsideration and withdrawal of the rejection under 35 U.S.C. § 103(a) are respectfully requested.

Rejection of Claims 1, 2, 11, 14-17, 19-21, 23, 24, 27, 28, 30-32, 35-37, 40, 41, and 44-46 Under 35 U.S.C. 103(a) as being obvious over U.S. Pat. No. 5,801,057 (Smart et al., first cited in IDS filed on January 21, 2000) in view of Lin (supra)

The Examiner argues that Smart teaches all the limitations of the claimed invention, except that the length of the microneedles being between 500 µm and 1 mm, while Lin allegedly cures the defect.

Because of the admitted defect of Smart, and the failure of Lin to correct this defect as discussed above, Applicants submit that the combined teaching still fails to teach or suggest all the limitations of the claimed invention, even assuming without agreeing, for the sake of argument, that there is motivation to combine Smart and Lin.

Thus reconsideration and withdrawal of the rejection under 35 U.S.C. § 103(a) are respectfully requested.

CONCLUSION

In view of the foregoing amendments and remarks, Applicants submit that all pending claims are in condition for allowance. Early and favorable reconsideration is respectfully solicited. The Examiner may address any questions raised by this submission to the undersigned at 617-951-7000. Should an extension of time be required, Applicants hereby petition for same and request that the extension fee and any other fee required for timely consideration of this submission be charged to **Deposit Account No. 18-1945**, under Order No. **BVTP-P01-539**.

Dated: June 29, 2006

Respectfully submitted,

By Lisa M. Treannie
Lisa M. Treannie
Registration No.: 41,368
Fish & Neave IP Group
ROPES & GRAY LLP
One International Place
Boston, Massachusetts 02110-2624
(617) 951-7000
(617) 951-7050 (Fax)
Attorneys For Applicant